**Software System Attributes**

**Reliability;**

The system needs to be reliable. However, the application uses cloud services to store data, so if there is a shortage in connection between the application and the cloud, some of the operations that are performed by the system (data request) might be negatively affected which will end up with damaging the reliability of the system.

**Availability;**

When the overall structure of the system is taken into consideration, it can be said that the most important operations that system performs are; data request, data monitoring and athlete tracking. And among these; data monitoring has the highest priority in terms of availability since it is directly related with the AutomatedSOS. Since, the main purpose of this service is to provide immediate help in case of emergency, system intent to have the highest availability. On the other hand, for practical reasons it is not very likely for the system to be available at 24/7. As a very simple example, smartwatches are used for collecting data from individuals and in case of an interruption in Bluetooth connection, system will be unable to receive individual data and respond to any emergency case that might occur during this period.

**Security;**

In order to store the passwords of users in an encrypted format, the system must use the most recent and trustworthy encryption algorithms. Also, since the system works with sensitive data, it must be protected against the cyber-attacks that it might encounter.

**Maintainability;**

The application must be written with a clear code so it can evolve to meet the possible future changes. Also, codes should be explained with reasonable comments and all of the changes that are made during the developing phase should be explicitly documented.

**Portability;**

Since the application aims to reach high number of users, it can be integrated with different platforms and it needs to be portable. Also, it should be available to download on different operating systems. Moreover, new smart devices can be easily integrated with the system.